RAW SEQUENCE LISTING   DATE: 02/04/2003
PATENT APPLICATION: **US/09/443,986C**   TIME: 13:14:34

Input Set : **A:\EP.txt**
Output Set: **N:\CRF4\02042003\I443986C.raw**

```
 3 <110> APPLICANT: Elan Corporation
 4        O'Mahony, Daniel J.
 6 <120> TITLE OF INVENTION: RETRO-INVERSION PEPTIDES THAT TARGET GIT TRANSPORT RECEPTORS
AND RELATED
 7        METHODS
 9 <130> FILE REFERENCE: 25,478-A USA
11 <140> CURRENT APPLICATION NUMBER: US 09/443,986C
12 <141> CURRENT FILING DATE: 1999-11-19
14 <160> NUMBER OF SEQ ID NOS: 85
16 <170> SOFTWARE: PatentIn version 3.1
18 <210> SEQ ID NO: 1
19 <211> LENGTH: 15
20 <212> TYPE: PRT
21 <213> ORGANISM: Artificial Sequence
23 <220> FEATURE:
24 <223> OTHER INFORMATION: PAX2 15 mer fragment-D form retroinversion
26 <400> SEQUENCE: 1
28 Arg Thr Arg Leu Arg Arg Asn His Ser Ser His Lys Ala Asn Thr
29 1               5                  10                 15
32 <210> SEQ ID NO: 2
33 <211> LENGTH: 16
34 <212> TYPE: PRT
35 <213> ORGANISM: Artificial Sequence
37 <220> FEATURE:
38 <223> OTHER INFORMATION: P31 16 mer fragment- D form retroinversion
40 <400> SEQUENCE: 2
42 Gly Pro His Arg Arg Gly Arg Pro Asn Ser Arg Ser Ser Lys Arg Thr
43 1               5                  10                 15
46 <210> SEQ ID NO: 3
47 <211> LENGTH: 14
48 <212> TYPE: PRT
49 <213> ORGANISM: Artificial Sequence
51 <220> FEATURE:
52 <223> OTHER INFORMATION: HAX42 14 mer fragment-D form retroinversion
54 <400> SEQUENCE: 3
56 Gly Thr Ser Asn Gly Asn Gly Cys Cys Asn Tyr Asp Gly Pro
57 1               5                  10
60 <210> SEQ ID NO: 4
61 <211> LENGTH: 15
62 <212> TYPE: PRT
63 <213> ORGANISM: Artificial Sequence
65 <220> FEATURE:
66 <223> OTHER INFORMATION: PAX2 15 mer fragment
68 <400> SEQUENCE: 4
```

ENTERED

```
 70 Thr Asn Ala Lys His Ser Ser His Asn Arg Arg Leu Arg Thr Arg
 71 1           5                   10                  15
 74 <210> SEQ ID NO: 5
 75 <211> LENGTH: 16
 76 <212> TYPE: PRT
 77 <213> ORGANISM: Artificial Sequence
 79 <220> FEATURE:
 80 <223> OTHER INFORMATION: P31 16 mer fragment
 82 <400> SEQUENCE: 5
 84 Thr Arg Lys Ser Ser Arg Ser Asn Pro Arg Gly Arg Arg His Pro Gly
 85 1           5                   10                  15
 88 <210> SEQ ID NO: 6
 89 <211> LENGTH: 14
 90 <212> TYPE: PRT
 91 <213> ORGANISM: Artificial Sequence
 93 <220> FEATURE:
 94 <223> OTHER INFORMATION: HAX42 14 mer fragment
 96 <400> SEQUENCE: 6
 98 Pro Gly Asp Tyr Asn Cys Cys Gly Asn Gly Asn Ser Thr Gly
 99 1           5                   10
102 <210> SEQ ID NO: 7
103 <211> LENGTH: 40
104 <212> TYPE: PRT
105 <213> ORGANISM: Artificial Sequence
107 <220> FEATURE:
108 <223> OTHER INFORMATION: PAX2 full length
110 <400> SEQUENCE: 7
112 Ser Thr Pro Pro Ser Arg Glu Ala Tyr Ser Arg Pro Tyr Ser Val Asp
113 1           5                   10                  15
116 Ser Asp Ser Asp Thr Asn Ala Lys His Ser Ser His Asn Arg Arg Leu
117             20                  25                  30
120 Arg Thr Arg Ser Arg Pro Asn Gly
121             35                  40
124 <210> SEQ ID NO: 8
125 <211> LENGTH: 45
126 <212> TYPE: PRT
127 <213> ORGANISM: Artificial Sequence
129 <220> FEATURE:
130 <223> OTHER INFORMATION: HAX42 full length, N-terminal Lysine is dansylated
132 <220> FEATURE:
133 <221> NAME/KEY: MOD_RES
134 <222> LOCATION: (1)..(1)
135 <223> OTHER INFORMATION: Dansylated L-Lysine
138 <400> SEQUENCE: 8
140 Lys Ser Asp His Ala Leu Gly Thr Asn Leu Arg Ser Asp Asn Ala Lys
141 1           5                   10                  15
144 Glu Pro Gly Asp Tyr Asn Cys Cys Gly Asn Gly Asn Ser Thr Gly Arg
145             20                  25                  30
148 Lys Val Phe Asn Arg Arg Arg Pro Ser Ala Ile Pro Thr
```

RAW SEQUENCE LISTING
PATENT APPLICATION: **US/09/443,986C**

DATE: 02/04/2003
TIME: 13:14:34

Input Set : **A:\EP.txt**
Output Set: **N:\CRF4\02042003\I443986C.raw**

```
149          35                 40                45
152 <210> SEQ ID NO: 9
153 <211> LENGTH: 16
154 <212> TYPE: PRT
155 <213> ORGANISM: Artificial Sequence
157 <220> FEATURE:
158 <223> OTHER INFORMATION: ZElan 144; PAX2 15 mer fragment-D form retroinversion with
addi
159        tional L-lysine in position 1
161 <220> FEATURE:
162 <221> NAME/KEY: MOD_RES
163 <222> LOCATION: (1)..(1)
164 <223> OTHER INFORMATION: Dansylated L-lysine
167 <400> SEQUENCE: 9
169 Lys Arg Thr Arg Leu Arg Arg Asn His Ser Ser His Lys Ala Asn Thr
170 1              5                 10                15
173 <210> SEQ ID NO: 10
174 <211> LENGTH: 17
175 <212> TYPE: PRT
176 <213> ORGANISM: Artificial Sequence
178 <220> FEATURE:
179 <223> OTHER INFORMATION: ZElan 145; P31 16 mer fragment- D form retroinversion with
additi
180        onal L-lysine in position 1
182 <220> FEATURE:
183 <221> NAME/KEY: MOD_RES
184 <222> LOCATION: (1)..(1)
185 <223> OTHER INFORMATION: dansylated L-lysine
188 <400> SEQUENCE: 10
190 Lys Gly Pro His Arg Arg Gly Arg Pro Asn Ser Arg Ser Ser Lys Arg
191 1              5                 10                15
194 Thr
198 <210> SEQ ID NO: 11
199 <211> LENGTH: 15
200 <212> TYPE: PRT
201 <213> ORGANISM: Artificial Sequence
203 <220> FEATURE:
204 <223> OTHER INFORMATION: ZElan 146; HAX42 14 mer fragment-D form retroinversion with
addit
205        ional L-Lysine in position 1
207 <220> FEATURE:
208 <221> NAME/KEY: MOD_RES
209 <222> LOCATION: (1)..(1)
210 <223> OTHER INFORMATION: dansylated L-Lysine
213 <400> SEQUENCE: 11
215 Lys Gly Thr Ser Asn Gly Asn Gly Cys Cys Asn Tyr Asp Gly Pro
216 1              5                 10                15
219 <210> SEQ ID NO: 12
220 <211> LENGTH: 16
221 <212> TYPE: PRT
222 <213> ORGANISM: Artificial Sequence
224 <220> FEATURE:
```

RAW SEQUENCE LISTING   DATE: 02/04/2003
PATENT APPLICATION: **US/09/443,986C**   TIME: 13:14:34

Input Set : **A:\EP.txt**
Output Set: **N:\CRF4\02042003\I443986C.raw**

```
225 <223> OTHER INFORMATION: ZElan 129; PAX2 15 mer fragment with additional L-Lysine in
posi
226     tion 1
228 <220> FEATURE:
229 <221> NAME/KEY: MOD_RES
230 <222> LOCATION: (1)..(1)
231 <223> OTHER INFORMATION: dansylated L-Lysine
234 <400> SEQUENCE: 12
236 Lys Thr Asn Ala Lys His Ser Ser His Asn Arg Arg Leu Arg Thr Arg
237 1               5                   10              15
240 <210> SEQ ID NO: 13
241 <211> LENGTH: 17
242 <212> TYPE: PRT
243 <213> ORGANISM: Artificial Sequence
245 <220> FEATURE:
246 <223> OTHER INFORMATION: ZElan 031; P31 16 mer fragment with additional L-Lysine in
positi
247     on 1
249 <220> FEATURE:
250 <221> NAME/KEY: MOD_RES
251 <222> LOCATION: (1)..(1)
252 <223> OTHER INFORMATION: dansylated L-Lysine
255 <400> SEQUENCE: 13
257 Lys Thr Arg Lys Ser Ser Arg Ser Asn Pro Arg Gly Arg Arg His Pro
258 1               5                   10              15
261 Gly
265 <210> SEQ ID NO: 14
266 <211> LENGTH: 15
267 <212> TYPE: PRT
268 <213> ORGANISM: Artificial Sequence
270 <220> FEATURE:
271 <223> OTHER INFORMATION: ZElan 091; HAX42 14 mer fragment with additional L-lysine in
posi
272     tion 1
274 <220> FEATURE:
275 <221> NAME/KEY: MOD_RES
276 <222> LOCATION: (1)..(1)
277 <223> OTHER INFORMATION: dansylated L-lysine
280 <400> SEQUENCE: 14
282 Lys Pro Gly Asp Tyr Asn Cys Cys Gly Asn Gly Asn Ser Thr Gly
283 1               5                   10              15
286 <210> SEQ ID NO: 15
287 <211> LENGTH: 41
288 <212> TYPE: PRT
289 <213> ORGANISM: Artificial Sequence
291 <220> FEATURE:
292 <223> OTHER INFORMATION: PAX2 full length, N-terminal Lysine is dansylated
294 <220> FEATURE:
295 <221> NAME/KEY: MOD_RES
296 <222> LOCATION: (1)..(1)
297 <223> OTHER INFORMATION: dansylated L-Lysine
300 <400> SEQUENCE: 15
```

```
302 Lys Ser Thr Pro Pro Ser Arg Glu Ala Tyr Ser Arg Pro Tyr Ser Val
303 1               5               10              15
306 Asp Ser Asp Ser Asp Thr Asn Ala Lys His Ser Ser His Asn Arg Arg
307             20          25              30
310 Leu Arg Thr Arg Ser Arg Pro Asn Gly
311         35              40
314 <210> SEQ ID NO: 16
315 <211> LENGTH: 44
316 <212> TYPE: PRT
317 <213> ORGANISM: Artificial Sequence
319 <220> FEATURE:
320 <223> OTHER INFORMATION: S15 44 mer fragment L-form
322 <400> SEQUENCE: 16
324 Arg Ser Gly Ala Tyr Glu Ser Pro Asp Gly Arg Gly Gly Arg Ser Tyr
325 1               5               10              15
328 Val Gly Gly Gly Gly Gly Cys Gly Asn Ile Gly Arg Lys His Asn Leu
329             20          25              30
332 Trp Gly Leu Arg Thr Ala Ser Pro Ala Cys Trp Asp
333         35              40
336 <210> SEQ ID NO: 17
337 <211> LENGTH: 44
338 <212> TYPE: PRT
339 <213> ORGANISM: Artificial Sequence
341 <220> FEATURE:
342 <223> OTHER INFORMATION: S21 44 mer fragment L-form
344 <400> SEQUENCE: 17
346 Ser Pro Arg Ser Phe Trp Pro Val Val Ser Arg His Glu Ser Phe Gly
347 1               5               10              15
350 Ile Ser Asn Tyr Leu Gly Cys Gly Tyr Arg Thr Cys Ile Ser Gly Thr
351             20          25              30
354 Met Thr Lys Ser Ser Pro Ile Tyr Pro Arg His Ser
355         35              40
358 <210> SEQ ID NO: 18
359 <211> LENGTH: 44
360 <212> TYPE: PRT
361 <213> ORGANISM: Artificial Sequence
363 <220> FEATURE:
364 <223> OTHER INFORMATION: S22 44 mer fragment L-form
366 <400> SEQUENCE: 18
368 Ser Ser Ser Ser Asp Trp Gly Gly Val Pro Gly Lys Val Val Arg Glu
369 1               5               10              15
372 Arg Phe Lys Gly Arg Gly Cys Gly Ile Ser Ile Thr Ser Val Leu Thr
373             20          25              30
376 Gly Lys Pro Asn Pro Cys Pro Glu Pro Lys Ala Ala
377         35              40
380 <210> SEQ ID NO: 19
381 <211> LENGTH: 44
382 <212> TYPE: PRT
383 <213> ORGANISM: Artificial Sequence
```

RAW SEQUENCE LISTING ERROR SUMMARY   DATE: 02/04/2003
PATENT APPLICATION: US/09/443,986C   TIME: 13:14:35

Input Set : **A:\EP.txt**
Output Set: **N:\CRF4\02042003\I443986C.raw**

<u>Please Note:</u>
Use of n and/or Xaa have been detected in the Sequence Listing. Please review the
Sequence Listing to ensure that a corresponding explanation is presented in the <220>
to <223> fields of each sequence which presents at least one n or Xaa.

Seq#:73; Xaa Pos. 1,3,4,6,7,8,10
Seq#:74; Xaa Pos. 2,4,7,8
Seq#:75; Xaa Pos. 7,8

<u>Invalid Line Length:</u>
The rules require that a line not exceed 72 characters in length. This includes spaces.

Seq#:1; Line(s) 6